



1999

NORTH DAKOTA

SALES RATIO STUDY

Office of State Tax Commissioner

RICK CLAYBURGH
STATE TAX COMMISSIONER

State Capitol
600 E. Boulevard Avenue
Bismarck, North Dakota 58505-0599

1999 North Dakota Assessment Sales Ratio Study

Introduction

The 1999 Assessment Sales Ratio Study (ASRS) has been conducted according to the provisions of North Dakota Century Code §§ 57-01-05 through 57-01-07 by the Property Tax Division of the Office of State Tax Commissioner, under the supervision of the State Supervisor of Assessments. The study is prepared for the purpose of advising local assessment officials, and to recommend to the Tax Commissioner changes to be made by the State Board of Equalization in the performance of the equalization duties prescribed by law. This report is a synopsis of the comprehensive study. This information may be utilized by property tax administrators, local assessing officials, and interested taxpayers in examining the assessment levels and the uniformity of assessments throughout North Dakota.

The Study puts major emphasis on sales of improved properties in the residential and commercial categories, because the statutes require the use of market values by the local assessment officials and State Board of Equalization in the assessment and equalization of these two classes of property. The data in the ASRS and in this report are accumulated for each of the 53 counties and 13 largest cities in North Dakota.

The current study includes the data on sales of property occurring between January 1 and December 31, 1998. In some areas, there were so few sales during this time that additional observations had to be obtained to provide an adequate sample size. A minimum sample size of 30 sales each for residential and commercial property was required, or 10 percent of the total number of properties in each class. If the number of sales that occurred during 1998 did not meet the minimum sample size, sales of property from the prior years of 1995, 1996 and 1997, or current year appraisals were used to supplement the sales data. Appraisals were used in those cases where the number of current and prior years sales were not sufficient to meet the minimum sample size. The county directors of tax equalization or full-time city assessors were responsible for providing the property appraisal data to the Property Tax Division when needed. A minimum sample size was not established for the categories of agricultural, lakeshore, mobile homes, or vacant lot properties because, in some cases, the assessment process is different or is not connected to market value concepts.

There are 11,522 observations in the present ASRS which are used for this report. In all cases, the finalized 1999 assessment was used as the base with which to measure the relationship between the assessment and the sale price or appraisal value.

Statistical Report

This report has six basic tables of statistical data. Table 1 provides an alphabetical listing of the 53 counties and 13 largest cities, showing the price and value figures and the accompanying statistical data used for developing measures for interpreting and understanding the ASRS. The data has been stratified into the property categories of agricultural, commercial, vacant lots, residential, lakeshore, and mobile homes, with subtotals and city or county totals. Table 2 contains a frequency distribution chart, which clearly depicts the ratios by grouping the individual ratios at intervals of five percentage points, starting with those under 45 percent and continuing to those over 140 percent. The distribution has been made for each county and major city and includes a breakdown of township and urban sales. Table 3 indicates the number and characteristics of the observations in each sample for the residential and commercial categories. Sales include those transactions which have occurred during 1998, while the supplemental observation include sales of improved residential and commercial properties for the

1999 North Dakota Assessment Sales Ratio Study

years 1995, 1996 and 1997, as well as appraisals when required to obtain a sufficient sample size. Table 4 presents an alphabetical listing of the 53 counties and 13 largest cities showing the median ratios and coefficient of dispersion for the current and four prior years for residential property and the same data for commercial property is located in table 5. Tables 4 and 5 also includes overall statewide data for the same time periods. These tables provides a brief summary of current and prior years data which may be used for convenient comparison of data between various counties and cities and categories of property for more than one year. Table 6 provides an alphabetical listing of the 53 counties showing the median ratio and the average price per acre paid for agricultural land. The table also shows the number of agricultural sales in the ASRS for each county.

The statistical data in Table 1 includes the following measures: (1) arithmetic mean ratio, (2) aggregate mean ratio, (3) median ratio, (4) price-related differential, and (5) coefficient of dispersion. The arithmetic mean, aggregate mean, and median are measures of the central tendency, which indicate the prevailing level of assessment of the universe of properties from which the sample has been drawn. Each of these measures has its own advantages and limitations. The price-related differential reveals any assessment bias that may exist for valuing high-priced properties higher or lower, by percentage, than lower-priced properties. The final measure is the coefficient of dispersion, which discloses the dispersion around the central tendency and describes the degree of uniformity that has been obtained in the assessments of the sample properties. This is sometimes referred to as the index of assessment inequality.

The arithmetic mean is developed by first computing a ratio for each observation in a stratum, then dividing the sum of the individual ratios by the number of observations. This measure is sometimes referred to as the simple mathematical average of the individual ratios. It is the one measure of central tendency which is most easily understood; however, it is greatly distorted by extreme ratios and therefore may not be typical.

The aggregate mean is a second measure of the central tendency and is derived by dividing the total assessed values for all the observations by the total sale prices of those properties. It is commonly referred to as a weighted average and is greatly influenced by the properties with the greatest value, and therefore may not be typical.

The median is the third measure of the central tendency and is found by arranging the individual ratios in order of magnitude, then selecting the middle ratio in the series. The median is affected by the number of observations and is not distorted by the size of the extreme ratios. While other statistical measures are considered, currently the State Board of Equalization uses the median ratio when equalizing residential and commercial property assessments.

The price-related differential (PRD), also known as the index of regression, is a measurement of the relationship between the ratios of high-value and low-value properties to determine if the value of property has any influence on the assessment ratio. It is obtained by dividing the arithmetic mean ratio by the aggregate mean ratio, and it provides an indicator of the degree to which high-value properties are overassessed or underassessed in relation to low-value properties. When the PRD is 1.00, there is no bias in the assessments of high-value properties in comparison to those for low-value properties. When the PRD is greater than 1.00 the assessments are regressive, which means low-value properties have a higher assessment ratio than high-value properties. Therefore, the owner of a low-value property pays a greater amount of tax in relation to value than the owner of a high-value property. Conversely, a PRD less than 1.00 indicates that high-value properties are overassessed in relation to

1999 North Dakota Assessment Sales Ratio Study

low-value properties. The *Standard on Ratio Studies*, adopted by the International Association of Assessing Officers, July 1990, recommends that the PRD should lie between .98 and 1.03.

The coefficient of dispersion is used to measure how closely the individual ratios are arrayed around the median ratio and will show the degree of uniformity or inaccuracy that has been attained in the assessments.

The coefficient of dispersion is computed by dividing the average deviation by the median ratio, and it will show how far the middle cluster of ratios is from the median or how far one must deviate from the median ratio (above or below) to encompass the middle cluster of ratios. For example, a .20 dispersion means that the middle cluster of ratios falls within 20 percent of the median. The closer the ratios are grouped around the median, the more equitable the assessment of property, because individual properties are assessed at the same ratio. Conversely, if the dispersion is quite large, there is a large spread in the ratios and a large spread in the assessment of property, which results in an inequity in the tax. Tax administrators feel that when dispersions occur between .10 and .20 the quality of assessments is acceptable, whereas any dispersions over .20 indicate the assessments need attention.

Sales Ratio Statistics

To help illustrate the five listed measures, the following example will demonstrate the calculations used for developing them:

	Finalized Sale Price	T & F Value	Ratio	Array	Deviation From Median
1.	\$ 42,000	\$ 36,500	87.9%	99.0	5.9
2.	83,500	81,000	97.0	98.7	5.6
3.	65,000	57,900	89.1	97.0	3.9
4.	79,000	78,200	99.0	96.2	3.1
5.	37,000	32,900	88.9	93.7	.6
6.	87,000	81,500	93.7	92.4	.7
7.	54,000	49,900	92.4	90.9	2.2
8.	81,900	80,800	98.7	89.1	4.0
9.	46,000	41,800	90.9	88.9	4.2
10.	<u>58,300</u>	<u>56,100</u>	<u>96.2</u>	86.9	<u>6.2</u>
	\$633,700	\$596,600	932.8		36.4

$$\text{Arithmetic Mean Ratio} = 932.8 \div 10 = 93.28$$

$$\text{Aggregate Mean Ratio} = \$596,600 \div \$633,700 = 94.1$$

$$\text{Median} = \text{Middle Ratio} = 93.7 + 92.4 = 186.1 \div 2 = 93.05 \text{ or } 93.1$$

$$\text{Price Related Differential} = 93.28 \div 94.1 = .99$$

$$\text{Average Deviation} = 36.4 \div 10 = 3.64$$

$$\text{Coefficient of Dispersion} = 3.64 \div 93.1 = .039 \text{ or } .04$$

Table 1
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Adams County									
Agricultural	22	2,129,358	1,326,675	66.0	62.3	63.2	1.1	0.24	
Commercial	20	2,551,292	2,569,857	100.2	100.7	100.0	10.0	0.01	
Vacant Lots	1	7,000	3,000	42.9	42.9	42.9	0.0	0.00	
Total Comm. & Vac. Lots	21	2,558,292	2,572,857	97.5	100.6	100.0	1.0	0.03	
Residential	45	1,506,650	1,502,743	122.5	99.7	99.4	1.2	0.31	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	45	1,506,650	1,502,743	122.5	99.7	99.4	1.2	0.31	
Mobile Homes	4	157,981	155,459	95.8	98.4	100.0	0.0	0.00	
Total County	92	6,352,281	5,557,734	102.1	87.5	99.5	1.2	0.25	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Barnes County									
Agricultural	17	1,405,929	1,015,900	70.6	72.3	68.8	1.0	0.15	
Commercial	30	960,775	986,565	103.4	102.7	100.0	1.0	0.15	
Vacant Lots	6	22,800	13,200	61.8	57.9	72.7	0.0	0.00	
Total Comm. & Vac. Lots	36	983,575	999,765	96.5	101.6	98.8	1.0	0.19	
Residential	36	895,400	715,370	110.7	79.9	97.5	1.4	0.42	
Lakeshore	3	71,000	35,950	57.0	50.6	42.6	0.0	0.00	
Total Res. & Lakeshore	39	966,400	751,320	106.5	77.7	95.6	1.4	0.42	
Mobile Homes	11	79,200	64,000	140.2	80.8	84.4	1.7	0.93	
Total County	103	3,435,104	2,830,985	100.7	82.4	90.9	1.2	0.38	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Valley City									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	30	3,274,300	3,261,300	132.1	99.6	100.6	1.3	0.34	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	30	3,274,300	3,261,300	132.1	99.6	100.6	1.3	0.34	
Residential	83	4,081,575	4,034,600	99.6	98.8	97.7	1.0	0.07	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	83	4,081,575	4,034,600	99.6	98.8	97.7	1.0	0.07	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total City	113	7,355,875	7,295,900	108.2	99.2	99.5	1.1	0.15	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Benson County								
Agricultural	26	1,847,068	1,433,810	82.2	77.6	76.7	1.1	0.26
Commercial	31	969,660	1,016,052	113.4	104.8	100.0	1.1	0.23
Vacant Lots	4	2,350	2,360	202.9	100.4	170.1	0.0	0.00
Total Comm. & Vac. Lots	35	972,010	1,018,412	123.7	104.8	100.0	1.2	0.36
Residential	42	975,968	899,623	113.5	92.2	99.7	1.2	0.27
Lakeshore	4	152,500	87,902	61.8	57.6	54.9	0.0	0.00
Total Res. & Lakeshore	46	1,128,468	987,525	109.0	87.5	99.3	1.3	0.28
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	107	3,947,546	3,439,747	107.3	87.1	99.0	1.2	0.31

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Billings County								
Agricultural	2	152,000	65,495	43.2	43.1	43.2	0.0	0.00
Commercial	8	594,000	595,800	97.8	100.3	97.1	1.0	0.09
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	8	594,000	595,800	97.8	100.3	97.1	1.0	0.09
Residential	11	488,800	454,600	95.6	93.0	100.0	1.0	0.04
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	11	488,800	454,600	95.6	93.0	100.0	1.0	0.04
Mobile Homes	2	10,200	8,032	78.8	78.7	78.8	0.0	0.00
Total County	23	1,245,000	1,123,927	90.3	90.3	100.0	1.0	0.12

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Bottineau County								
Agricultural	35	2,644,958	1,769,200	68.8	66.9	65.9	1.0	0.18
Commercial	30	2,250,856	2,273,216	101.8	101.0	100.9	1.0	0.17
Vacant Lots	7	21,243	10,942	60.5	51.5	31.1	0.0	0.00
Total Comm. & Vac. Lots	37	2,272,099	2,284,158	94.0	100.5	100.0	0.9	0.27
Residential	52	1,989,368	1,814,428	98.0	91.2	95.8	1.1	0.22
Lakeshore	51	1,833,585	802,250	43.9	43.8	37.6	1.0	0.45
Total Res. & Lakeshore	103	3,822,953	2,616,678	71.2	68.4	68.7	1.0	0.46
Mobile Homes	7	149,642	128,155	278.2	85.6	89.4	0.0	0.00
Total County	182	8,889,652	6,798,191	83.3	76.5	73.7	1.1	0.49

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Bowman County								
Agricultural	13	1,585,488	817,300	53.6	51.5	57.8	1.0	0.21
Commercial	14	652,884	604,700	102.9	92.6	93.5	1.1	0.29
Vacant Lots	1	5,000	4,800	96.0	96.0	96.0	0.0	0.00
Total Comm. & Vac. Lots	15	657,884	609,500	102.5	92.6	96.0	1.1	0.26
Residential	33	1,531,900	1,421,400	108.6	92.8	98.2	1.2	0.33
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	33	1,531,900	1,421,400	108.6	92.8	98.2	1.2	0.33
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	61	3,775,272	2,848,200	95.4	75.4	83.1	1.3	0.38

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Burke County								
Agricultural	9	447,500	358,415	87.0	80.1	84.0	1.1	0.17
Commercial	22	471,944	463,200	97.7	98.1	99.9	1.0	0.05
Vacant Lots	3	4,950	3,436	84.9	69.4	98.2	0.0	0.00
Total Comm. & Vac. Lots	25	476,894	466,636	96.1	97.8	99.8	1.0	0.07
Residential	30	570,756	543,008	102.9	95.1	101.5	1.1	0.16
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	30	570,756	543,008	102.9	95.1	101.5	1.1	0.16
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	64	1,495,150	1,368,059	98.0	91.5	98.5	1.1	0.13

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Burleigh County								
Agricultural	3	168,600	157,572	92.8	93.5	93.8	0.0	0.00
Commercial	18	2,284,300	2,145,300	100.1	93.9	99.5	1.1	0.08
Vacant Lots	22	392,350	380,557	103.3	97.0	100.0	1.1	0.10
Total Comm. & Vac. Lots	40	2,676,650	2,525,857	101.8	94.4	100.0	1.1	0.09
Residential	85	9,780,067	9,488,144	97.3	97.0	96.9	1.0	0.06
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	85	9,780,067	9,488,144	97.3	97.0	96.9	1.0	0.06
Mobile Homes	111	3,106,682	2,925,735	92.5	94.2	94.7	1.0	0.14
Total County	239	15,731,999	15,097,308	95.7	96.0	96.4	1.0	0.10

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Bismarck									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	32	5,812,168	5,884,200	95.2	101.2	94.0	0.9	0.10	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	32	5,812,168	5,884,200	95.2	101.2	94.0	0.9	0.10	
Residential	714	69,599,979	65,368,700	94.0	93.9	94.4	1.0	0.06	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	714	69,599,979	65,368,700	94.0	93.9	94.4	1.0	0.06	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total City	746	75,412,147	71,252,900	94.0	94.5	94.4	1.0	0.06	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Cass County									
Agricultural	46	9,413,156	4,954,100	57.3	52.6	55.1	1.1	0.21	
Commercial	30	2,686,425	2,516,400	106.3	93.7	94.6	1.1	0.39	
Vacant Lots	77	1,313,500	633,000	73.3	48.2	47.5	1.5	0.89	
Total Comm. & Vac. Lots	107	3,999,925	3,149,400	82.5	78.7	60.4	1.1	0.76	
Residential	245	21,242,136	18,838,000	95.1	88.7	91.5	1.1	0.21	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	245	21,242,136	18,838,000	95.1	88.7	91.5	1.1	0.21	
Mobile Homes	158	2,954,196	2,611,122	111.6	88.4	89.5	1.3	0.45	
Total County	556	37,609,413	29,552,622	94.2	78.6	85.0	1.2	0.38	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Fargo									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	39	13,868,981	14,094,600	100.8	101.6	94.0	1.0	0.18	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	39	13,868,981	14,094,600	100.8	101.6	94.0	1.0	0.18	
Residential	1,246	130,983,100	119,371,700	91.1	91.1	90.0	1.0	0.09	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	1,246	130,983,100	119,371,700	91.1	91.1	90.0	1.0	0.09	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total City	1,285	144,852,081	133,466,300	91.4	92.1	90.1	1.0	0.09	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of West Fargo									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	33	4,308,100	3,830,600	92.2	88.9	96.2	1.0	0.14	
Vacant Lots	65	1,545,696	1,349,700	101.5	87.3	104.8	1.2	0.15	
Total Comm. & Vac. Lots	98	5,853,796	5,180,300	98.4	88.5	101.8	1.1	0.16	
Residential	263	24,832,002	23,314,100	94.0	93.9	94.9	1.0	0.08	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	263	24,832,002	23,314,100	94.0	93.9	94.9	1.0	0.08	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Total City	361	30,685,798	28,494,400	95.2	92.9	96.2	1.0	0.11	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Cavalier County									
Agricultural	27	2,388,591	1,328,980	57.3	55.6	56.3	1.0	0.12	
Commercial	31	1,845,008	1,905,900	103.3	103.3	98.0	1.0	0.12	
Vacant Lots	3	28,500	20,444	74.8	71.7	74.0	0.0	0.00	
Total Comm. & Vac. Lots	34	1,873,508	1,926,344	100.8	102.8	97.6	1.0	0.13	
Residential	54	2,444,421	2,447,972	122.2	100.1	103.6	1.2	0.34	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	54	2,444,421	2,447,972	122.2	100.1	103.6	1.2	0.34	
Mobile Homes	1	4,500	4,981	110.7	110.7	110.7	0.0	0.00	
Total County	116	6,711,020	5,708,277	100.7	85.1	95.6	1.2	0.31	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Dickey County									
Agricultural	35	3,151,185	2,522,562	83.4	80.1	82.5	1.0	0.16	
Commercial	30	1,595,350	1,545,109	109.8	96.9	97.7	1.1	0.27	
Vacant Lots	6	31,500	30,614	115.3	97.2	95.8	0.0	0.00	
Total Comm. & Vac. Lots	36	1,626,850	1,575,723	110.7	96.9	97.7	1.1	0.31	
Residential	55	1,700,015	1,389,231	129.0	81.7	89.4	1.6	0.68	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	55	1,700,015	1,389,231	129.0	81.7	89.4	1.6	0.68	
Mobile Homes	7	124,195	106,462	83.5	85.7	96.3	0.0	0.00	
Total County	133	6,602,245	5,593,978	109.7	84.7	89.4	1.3	0.44	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

Divide County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	19	1,690,107	1,087,200	61.9	64.3	60.1	1.0	0.18
Commercial	14	734,900	684,640	115.3	93.2	97.7	1.2	0.42
Vacant Lots	1	2,500	2,000	80.0	80.0	80.0	0.0	0.00
Total Comm. & Vac. Lots	15	737,400	686,640	113.0	93.1	97.6	1.2	0.40
Residential	34	827,400	733,700	140.0	88.7	99.4	1.6	0.66
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	34	827,400	733,700	140.0	88.7	99.4	1.6	0.66
Mobile Homes	3	79,800	79,200	103.3	99.2	99.5	0.0	0.00
Total County	71	3,334,707	2,586,740	112.2	77.6	86.4	1.5	0.57

Dunn County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	20	1,594,992	891,218	61.8	55.9	53.3	1.1	0.34
Commercial	14	367,809	367,746	101.1	100.0	100.0	1.0	0.02
Vacant Lots	2	10,500	3,350	50.0	31.9	50.0	0.0	0.00
Total Comm. & Vac. Lots	16	378,309	371,096	94.7	98.1	100.0	1.0	0.08
Residential	31	736,612	725,361	111.0	98.5	98.1	1.1	0.22
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	31	736,612	725,361	111.0	98.5	98.1	1.1	0.22
Mobile Homes	3	65,102	62,896	110.1	96.6	100.3	0.0	0.00
Total County	70	2,775,015	2,050,571	93.2	73.9	96.2	1.3	0.25

Eddy County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	10	602,250	548,600	91.2	91.1	98.9	1.0	0.19
Commercial	22	1,917,500	1,913,000	99.4	99.8	100.0	1.0	0.01
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	22	1,917,500	1,913,000	99.4	99.8	100.0	1.0	0.01
Residential	58	1,748,125	1,573,800	94.9	90.0	94.7	1.1	0.15
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	58	1,748,125	1,573,800	94.9	90.0	94.7	1.1	0.15
Mobile Homes	2	8,500	16,900	921.3	198.8	921.3	0.0	0.00
Total County	92	4,276,375	4,052,300	113.5	94.8	99.2	1.2	0.30

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Emmons County									
Agricultural	12	1,221,705	729,094	59.5	59.7	55.8	1.0	0.25	
Commercial	27	2,597,280	2,412,662	99.9	92.9	100.0	1.1	0.14	
Vacant Lots	8	16,675	23,300	196.5	139.7	150.3	1.4	0.60	
Total Comm. & Vac. Lots	35	2,613,955	2,435,962	122.0	93.2	100.0	1.3	0.35	
Residential	34	1,055,866	980,053	120.8	92.8	96.9	1.3	0.35	
Lakeshore	4	10,450	7,800	77.2	74.6	99.2	0.0	0.00	
Total Res. & Lakeshore	38	1,066,316	987,853	116.2	92.6	97.3	1.3	0.34	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	85	4,901,976	4,152,909	110.6	84.7	97.4	1.3	0.36	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Foster County									
Agricultural	9	802,500	564,620	76.4	70.4	71.4	1.1	0.18	
Commercial	28	4,549,400	4,550,000	100.0	100.0	100.0	1.0	0.00	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Comm. & Vac. Lots	28	4,549,400	4,550,000	100.0	100.0	100.0	1.0	0.00	
Residential	35	1,589,800	1,438,000	95.6	90.5	98.2	1.1	0.13	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	35	1,589,800	1,438,000	95.6	90.5	98.2	1.1	0.13	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	72	6,941,700	6,552,620	94.9	94.4	100.0	1.0	0.09	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Golden Valley County									
Agricultural	8	658,100	503,500	76.8	76.5	79.5	1.0	0.15	
Commercial	11	606,040	607,320	99.9	100.2	100.0	1.0	0.01	
Vacant Lots	1	1,000	1,020	102.0	102.0	102.0	0.0	0.00	
Total Comm. & Vac. Lots	12	607,040	608,340	100.1	100.2	100.0	1.0	0.01	
Residential	43	1,197,506	1,172,670	105.6	97.9	101.5	1.1	0.13	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	43	1,197,506	1,172,670	105.6	97.9	101.5	1.1	0.13	
Mobile Homes	0	0	0	0.0	0.0	0.0	1.1	0.00	
Total County	63	2,462,646	2,284,510	100.9	92.8	100.0	1.1	0.12	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Grand Forks County								
Agricultural	32	3,192,208	2,436,600	114.3	76.3	72.9	1.5	0.84
Commercial	30	6,830,850	6,778,116	149.3	99.2	104.1	1.5	0.65
Vacant Lots	26	493,901	165,392	108.0	33.5	35.9	3.2	2.63
Total Comm. & Vac. Lots	56	7,324,751	6,943,508	130.1	94.8	93.6	1.4	0.92
Residential	114	8,612,328	7,576,294	98.7	88.0	91.8	1.1	0.28
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	114	8,612,328	7,576,294	98.7	88.0	91.8	1.1	0.28
Mobile Homes	136	3,805,289	3,418,252	123.1	89.8	90.7	1.4	0.57
Total County	338	22,934,576	20,374,654	115.2	88.8	90.2	1.3	0.56

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
City of Grand Forks								
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	37	13,891,149	12,620,400	97.8	90.9	96.5	1.1	0.13
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	37	13,891,149	12,620,400	97.8	90.9	96.5	1.1	0.13
Residential	512	46,764,159	43,486,400	93.2	93.0	92.6	1.0	0.08
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	512	46,764,159	43,486,400	93.2	93.0	92.6	1.0	0.08
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	549	60,655,308	56,106,800	93.5	92.5	93.0	1.0	0.09

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Grant County								
Agricultural	22	1,421,058	956,768	67.1	67.3	66.2	1.0	0.21
Commercial	10	216,092	218,011	100.2	100.9	101.0	1.0	0.05
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	10	216,092	218,011	100.2	100.9	101.0	1.0	0.05
Residential	30	713,652	700,519	98.1	98.2	97.8	1.0	0.08
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	30	713,652	700,519	98.1	98.2	97.8	1.0	0.08
Mobile Homes	4	22,250	22,007	102.9	98.9	88.1	1.0	0.00
Total County	66	2,373,052	1,897,305	88.3	80.0	92.3	1.1	0.18

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Griggs County									
Agricultural	8	756,420	536,172	76.6	70.9	74.5	1.1	0.12	
Commercial	19	1,402,343	1,381,200	98.9	98.5	98.8	1.0	0.06	
Vacant Lots	1	3,500	1,992	56.9	56.9	56.9	0.0	0.00	
Total Comm. & Vac. Lots	20	1,405,843	1,383,192	96.8	98.4	98.3	1.0	0.08	
Residential	39	1,500,250	1,432,092	98.9	95.5	99.3	1.0	0.07	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	39	1,500,250	1,432,092	98.9	95.5	99.3	1.0	0.07	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	67	3,662,513	3,351,456	95.6	91.5	98.0	1.0	0.09	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Hettinger County									
Agricultural	16	1,502,294	813,390	53.7	54.1	53.9	1.0	0.14	
Commercial	14	315,800	316,700	100.7	100.3	100.8	1.0	0.02	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Comm. & Vac. Lots	14	315,800	316,700	100.7	100.3	100.8	1.0	0.02	
Residential	31	439,811	405,990	94.3	92.3	95.5	1.0	0.13	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	31	439,811	405,990	94.3	92.3	95.5	1.0	0.13	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	61	2,257,905	1,536,080	85.1	68.0	95.0	1.3	0.20	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Kidder County									
Agricultural	6	222,500	184,298	81.0	82.8	82.7	0.0	0.00	
Commercial	14	438,360	417,413	103.4	95.2	104.1	1.1	0.14	
Vacant Lots	1	200	4,321	160.5	160.5	60.5	0.0	0.00	
Total Comm. & Vac. Lots	15	438,560	421,734	240.5	96.2	105.8	2.5	1.42	
Residential	31	989,900	1,027,316	196.0	103.8	106.2	1.9	0.97	
Lakeshore	5	187,150	109,853	68.6	58.7	64.0	0.0	0.00	
Total Res. & Lakeshore	36	1,177,050	1,137,169	178.3	96.6	104.0	1.9	0.91	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	57	1,838,110	1,743,201	184.4	94.8	100.9	1.9	1.01	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
LaMoure County								
Agricultural	20	1,602,344	1,156,700	73.4	72.2	71.5	1.0	0.24
Commercial	33	1,305,200	1,350,080	103.2	103.4	102.7	1.0	0.11
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	33	1,305,200	1,350,080	103.2	103.4	102.7	1.0	0.11
Residential	35	1,150,875	1,050,177	101.0	91.3	102.5	1.1	0.19
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	35	1,150,875	1,050,177	101.0	91.3	102.5	1.1	0.19
Mobile Homes	1	5,000	4,666	93.3	93.3	93.3	0.0	0.00
Total County	89	4,063,419	3,561,623	95.5	87.7	97.2	1.1	0.19

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Logan County								
Agricultural	18	1,380,330	943,600	70.0	68.4	63.6	1.0	0.22
Commercial	17	693,475	685,800	100.1	98.9	95.0	1.0	0.12
Vacant Lots	5	11,500	10,500	138.7	91.3	100.0	0.0	0.00
Total Comm. & Vac. Lots	22	704,975	696,300	108.8	98.8	95.2	1.1	0.23
Residential	30	377,320	346,400	104.4	91.8	99.4	1.1	0.19
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	30	377,320	346,400	104.4	91.8	99.4	1.1	0.19
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	70	2,462,625	1,986,300	97.0	80.7	94.8	1.2	0.24

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
McHenry County								
Agricultural	25	1,197,658	1,002,374	92.0	83.7	92.2	1.1	0.21
Commercial	30	1,154,885	1,138,149	110.5	98.6	100.3	1.1	0.19
Vacant Lots	7	21,225	7,936	35.3	37.4	35.8	0.0	0.00
Total Comm. & Vac. Lots	37	1,176,110	1,146,085	96.2	97.4	100.0	1.0	0.28
Residential	32	895,350	706,826	95.1	78.9	84.0	1.2	0.33
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	32	895,350	706,826	95.1	78.9	84.0	1.2	0.33
Mobile Homes	9	283,791	255,312	84.1	90.0	90.3	0.9	0.17
Total County	103	3,552,909	3,110,597	93.8	87.6	94.3	1.1	0.27

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
McIntosh County									
Agricultural	54	2,547,517	1,955,019	80.8	76.7	81.5	1.1	0.18	
Commercial	20	820,728	681,274	95.5	83.0	97.5	1.2	0.16	
Vacant Lots	6	12,200	7,739	69.4	63.4	53.0	0.0	0.00	
Total Comm. & Vac. Lots	26	832,928	689,013	89.5	82.7	93.2	1.1	0.21	
Residential	34	1,000,852	1,030,085	113.8	102.9	98.2	1.1	0.29	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	34	1,000,852	1,030,085	113.8	102.9	98.2	1.1	0.29	
Mobile Homes	1	3,000	3,496	116.5	116.5	116.5	0.0	0.00	
Total County	115	4,384,297	3,677,613	92.8	83.9	86.2	1.1	0.25	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
McKenzie County									
Agricultural	15	1,634,520	788,360	54.1	48.2	53.6	1.1	0.19	
Commercial	21	1,051,751	1,039,888	102.8	98.9	98.5	1.0	0.16	
Vacant Lots	3	14,250	13,180	107.2	92.5	127.3	0.0	0.00	
Total Comm. & Vac. Lots	24	1,066,001	1,053,068	103.4	98.8	99.2	1.1	0.21	
Residential	51	2,030,525	2,011,630	102.0	99.1	100.1	1.0	0.10	
Lakeshore	1	4,500	3,100	68.9	68.9	68.9	0.0	0.00	
Total Res. & Lakeshore	52	2,035,025	2,014,730	101.4	99.0	100.0	1.0	0.10	
Mobile Homes	4	55,000	49,296	96.7	89.6	87.5	0.0	0.00	
Total County	95	4,790,546	3,905,454	94.2	81.5	96.6	1.2	0.20	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
McLean County									
Agricultural	32	3,082,220	1,904,900	64.9	61.8	63.3	1.1	0.21	
Commercial	33	1,038,410	990,450	111.0	95.4	100.0	1.2	0.35	
Vacant Lots	37	250,964	178,950	93.7	71.3	76.9	1.3	0.59	
Total Comm. & Vac. Lots	70	1,289,374	1,169,400	101.8	90.7	87.8	1.1	0.48	
Residential	94	3,282,306	3,148,400	162.6	95.9	100.3	1.7	0.84	
Lakeshore	25	981,401	766,650	78.5	78.1	75.3	1.0	0.25	
Total Res. & Lakeshore	119	4,263,707	3,915,050	144.9	91.8	92.5	1.6	0.78	
Mobile Homes	14	126,100	87,024	215.2	69.0	86.6	3.1	1.76	
Total County	235	8,761,401	7,076,374	125.4	80.8	86.4	1.6	0.72	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Mercer County									
Agricultural	13	568,650	354,236	63.2	62.3	66.3	1.0	0.23	
Commercial	30	1,302,350	1,301,276	99.6	99.9	100.0	1.0	0.03	
Vacant Lots	24	141,110	139,214	157.5	98.7	100.6	1.6	0.84	
Total Comm. & Vac. Lots	54	1,443,460	1,440,490	125.4	99.8	100.0	1.3	0.39	
Residential	117	5,828,320	5,097,760	111.9	87.5	88.9	1.3	0.42	
Lakeshore	2	15,500	12,000	77.5	77.4	77.5	0.0	0.00	
Total Res. & Lakeshore	119	5,843,820	5,109,760	111.4	87.4	87.8	1.3	0.42	
Mobile Homes	7	148,400	118,495	175.3	79.8	98.9	0.0	0.00	
Total County	193	8,004,330	7,022,981	114.4	87.7	92.3	1.3	0.44	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Morton County									
Agricultural	22	1,731,113	1,104,200	63.2	63.8	62.1	1.0	0.14	
Commercial	30	1,494,005	1,407,500	108.5	94.2	100.0	1.2	0.23	
Vacant Lots	40	569,650	373,600	79.7	65.6	64.5	1.2	0.49	
Total Comm. & Vac. Lots	70	2,063,655	1,781,100	92.0	86.3	80.0	1.1	0.42	
Residential	78	3,137,009	2,728,750	107.0	87.0	96.0	1.2	0.34	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	78	3,137,009	2,728,750	107.0	87.0	96.0	1.2	0.34	
Mobile Homes	68	1,004,576	834,573	88.0	83.1	73.2	1.1	0.35	
Total County	238	7,936,353	6,448,623	93.1	81.3	80.0	1.2	0.39	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Mandan									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	31	5,155,900	4,547,100	94.4	88.2	93.7	1.1	0.13	
Vacant Lots	29	780,900	421,000	70.3	53.9	55.7	1.3	0.44	
Total Comm. & Vac. Lots	60	5,936,800	4,968,100	82.7	83.7	79.7	1.0	0.32	
Residential	170	13,502,500	12,435,900	92.3	92.1	92.0	1.0	0.07	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	170	13,502,500	12,435,900	92.3	92.1	92.0	1.0	0.07	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total City	230	19,439,300	17,404,000	89.8	89.5	90.6	1.0	0.13	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Mountrail County								
Agricultural	11	561,500	332,400	63.7	59.2	61.5	1.1	0.23
Commercial	30	1,399,300	1,399,300	100.3	100.0	100.0	1.0	0.02
Vacant Lots	2	4,250	5,300	122.5	124.7	122.5	0.0	0.00
Total Comm. & Vac. Lots	32	1,403,550	1,404,600	101.7	100.1	100.0	1.0	0.03
Residential	42	1,433,400	1,307,600	107.2	91.2	97.1	1.2	0.27
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	42	1,433,400	1,307,600	107.2	91.2	97.1	1.2	0.27
Mobile Homes	11	103,100	56,322	61.5	54.6	60.8	1.1	0.36
Total County	96	3,501,550	3,100,922	95.2	88.6	98.4	1.1	0.22

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Nelson County								
Agricultural	13	866,062	929,970	101.6	107.4	93.3	1.0	0.36
Commercial	19	823,857	839,183	127.3	101.9	103.9	1.3	0.41
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	19	823,857	839,183	127.3	101.9	103.9	1.3	0.41
Residential	40	808,300	694,141	153.7	85.9	100.0	1.8	0.86
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	40	808,300	694,141	153.7	85.9	100.0	1.8	0.86
Mobile Homes	1	56,753	61,056	107.6	107.6	107.6	0.0	0.00
Total County	73	2,554,972	2,524,350	136.9	98.8	103.9	1.4	0.62

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Oliver County								
Agricultural	13	1,703,465	950,651	57.2	55.8	55.2	1.0	0.18
Commercial	4	211,524	219,004	104.8	103.5	104.2	0.0	0.00
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	4	211,524	219,004	104.8	103.5	104.2	0.0	0.00
Residential	42	1,275,767	1,257,309	107.1	98.6	98.9	1.1	0.24
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	42	1,275,767	1,257,309	107.1	98.6	98.9	1.1	0.24
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	59	3,190,756	2,426,964	95.9	76.1	94.4	1.3	0.28

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Pembina County									
Agricultural	29	3,569,857	2,495,422	73.0	69.9	71.6	1.0	0.33	
Commercial	36	1,559,765	1,688,312	118.2	108.2	100.0	1.1	0.39	
Vacant Lots	9	118,250	48,278	45.7	40.8	35.6	1.1	0.42	
Total Comm. & Vac. Lots	45	1,678,015	1,736,590	103.7	103.5	96.3	1.0	0.43	
Residential	84	3,737,500	3,221,708	97.2	86.2	91.7	1.1	0.26	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	84	3,737,500	3,221,708	97.2	86.2	91.7	1.1	0.26	
Mobile Homes	6	86,856	67,800	97.6	78.1	84.3	0.0	0.00	
Total County	164	9,072,228	7,521,520	94.7	82.9	89.5	1.1	0.34	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Pierce County									
Agricultural	11	832,900	630,326	89.3	75.7	76.2	1.2	0.30	
Commercial	29	1,556,700	1,568,137	103.8	100.7	100.9	1.0	0.13	
Vacant Lots	2	7,800	5,320	70.8	68.2	70.8	0.0	0.00	
Total Comm. & Vac. Lots	31	1,564,500	1,573,457	101.7	100.6	100.7	1.0	0.14	
Residential	45	2,155,660	1,965,270	92.8	91.2	93.4	1.0	0.15	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	45	2,155,660	1,965,270	92.8	91.2	93.4	1.0	0.15	
Mobile Homes	6	205,130	149,613	71.8	72.9	74.2	0.0	0.00	
Total County	93	4,758,190	4,318,666	94.0	90.8	93.9	1.0	0.18	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Ramsey County									
Agricultural	21	2,100,627	1,533,982	86.5	73.0	75.0	1.2	0.31	
Commercial	12	248,950	247,240	103.5	99.3	100.0	1.0	0.08	
Vacant Lots	19	192,150	105,850	83.4	55.1	57.8	1.5	0.93	
Total Comm. & Vac. Lots	31	441,100	353,090	91.2	80.0	87.2	1.1	0.51	
Residential	34	1,635,500	1,555,202	102.1	95.7	96.2	1.1	0.21	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	34	1,635,500	1,555,202	102.1	95.1	96.2	1.1	0.21	
Mobile Homes	51	1,064,397	1,018,285	104.9	95.7	95.6	1.1	0.30	
Total County	137	5,241,624	4,460,559	98.3	85.1	92.0	1.2	0.33	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Devils Lake									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	31	3,603,159	3,593,300	107.5	99.7	101.6	1.1	0.27	
Vacant Lots	4	34,500	41,400	209.7	120.0	121.3	0.0	0.00	
Total Comm. & Vac. Lots	35	3,637,659	3,634,700	119.2	99.9	101.6	1.2	0.45	
Residential	83	4,014,735	3,886,700	101.5	96.8	96.4	1.1	0.16	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	83	4,014,735	3,886,700	101.5	96.8	96.4	1.1	0.16	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total City	118	7,652,394	7,521,400	106.7	98.3	96.6	1.1	0.25	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Ransom County									
Agricultural	15	1,409,746	1,134,300	78.9	80.5	78.4	1.0	0.12	
Commercial	31	2,094,050	2,068,420	104.8	98.8	100.0	1.1	0.16	
Vacant Lots	5	19,450	16,300	77.4	83.8	66.7	0.0	0.00	
Total Comm. & Vac. Lots	36	2,113,500	2,084,720	101.0	98.6	100.0	1.0	0.20	
Residential	61	2,696,701	2,268,800	102.7	84.1	87.1	1.2	0.35	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	61	2,696,701	2,268,800	102.7	84.1	87.1	1.2	0.35	
Mobile Homes	5	51,769	55,866	138.8	107.9	104.3	0.0	0.00	
Total County	117	6,271,716	5,543,686	100.7	88.4	93.3	1.1	0.30	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Renville County									
Agricultural	12	990,300	559,000	56.9	56.4	57.3	1.0	0.14	
Commercial	20	626,600	648,989	105.7	103.6	103.8	1.0	0.12	
Vacant Lots	2	3,500	4,800	13.3	137.1	113.3	0.0	0.00	
Total Comm. & Vac. Lots	22	630,100	653,789	106.4	103.8	103.8	1.0	0.14	
Residential	32	684,700	626,296	142.4	91.5	102.2	1.6	0.61	
Lakeshore	1	5,500	3,518	64.0	64.0	64.0	0.0	0.00	
Total Res. & Lakeshore	33	690,200	629,814	140.0	91.3	101.5	1.5	0.60	
Mobile Homes	3	174,150	159,144	90.3	91.4	89.7	0.0	0.00	
Total County	70	2,484,750	2,001,747	113.1	80.6	93.8	1.4	0.44	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Richland County									
Agricultural	30	4,949,434	2,624,300	56.8	53.0	54.8	1.1	0.18	
Commercial	31	23,443,041	23,416,150	95.4	99.9	100.0	1.0	0.12	
Vacant Lots	14	167,480	161,400	130.7	96.4	97.4	1.4	0.45	
Total Comm. & Vac. Lots	45	23,610,521	23,577,550	106.4	99.9	100.0	1.1	0.22	
Residential	62	2,717,450	2,381,600	95.5	87.6	95.1	1.1	0.21	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	62	2,717,450	2,381,600	95.5	87.6	95.1	1.1	0.21	
Mobile Homes	19	376,703	364,328	114.7	96.7	98.4	1.2	0.33	
Total County	156	31,654,108	28,947,778	93.6	91.5	91.6	1.0	0.28	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
City of Wahpeton									
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.0	0.00
Commercial	40	6,274,593	5,663,710	97.8	90.3	95.6	1.1	0.18	
Vacant Lots	5	169,000	72,500	73.7	42.9	82.6	0.0	0.00	
Total Comm. & Vac. Lots	45	6,443,593	5,736,210	95.1	89.0	95.3	1.1	0.20	
Residential	69	5,047,255	4,932,060	102.6	97.7	97.1	1.1	0.15	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	69	5,047,255	4,932,060	102.6	97.7	97.1	1.1	0.15	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total City	114	11,490,848	10,668,270	99.6	92.8	96.0	1.1	0.17	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Rolette County									
Agricultural	8	353,060	267,358	85.7	75.7	76.0	1.1	0.25	
Commercial	28	1,658,422	1,568,111	112.6	94.6	97.7	1.2	0.33	
Vacant Lots	8	33,550	15,370	95.9	45.8	63.4	2.1	0.96	
Total Comm. & Vac. Lots	36	1,691,972	1,583,481	108.9	93.6	94.3	1.2	0.43	
Residential	58	2,314,350	2,115,431	100.2	91.4	98.8	1.1	0.20	
Lakeshore	7	179,770	77,762	41.5	43.3	36.1	0.0	0.00	
Total Res. & Lakeshore	65	2,494,120	2,193,193	93.9	87.9	95.6	1.1	0.25	
Mobile Homes	4	51,595	44,909	98.7	87.0	100.9	0.0	0.00	
Total County	113	4,590,747	4,088,941	98.3	89.1	95.2	1.1	0.30	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Sargent County									
Agricultural	24	2,708,630	1,861,931	70.2	68.7	71.3	1.0	0.11	
Commercial	16	1,292,536	1,163,834	96.4	90.0	97.5	1.1	0.13	
Vacant Lots	5	32,700	22,740	68.5	69.5	64.4	0.0	0.00	
Total Comm. & Vac. Lots	21	1,325,236	1,186,574	89.7	89.5	93.2	1.0	0.18	
Residential	47	1,728,856	1,360,171	96.6	78.7	98.0	1.2	0.28	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	47	1,728,856	1,360,171	96.6	78.7	98.0	1.2	0.28	
Mobile Homes	3	38,000	36,462	104.7	96.0	93.7	0.0	0.00	
Total County	95	5,800,722	4,445,138	88.7	76.6	80.6	1.2	0.28	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Sheridan County									
Agricultural	14	556,751	461,170	83.6	82.8	76.6	1.0	0.12	
Commercial	6	139,020	139,848	127.9	100.6	100.3	0.0	0.00	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Comm. & Vac. Lots	6	139,020	139,848	127.9	100.6	100.3	0.0	0.00	
Residential	37	456,450	414,160	103.5	90.7	96.7	1.1	0.22	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	37	456,450	414,160	103.5	90.7	96.7	1.1	0.22	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	57	1,152,221	1,015,178	101.2	88.1	96.3	1.2	0.24	

	Total Sales	Verified Price	-----Sales Ratio-----					PRD	COD
			Assessed Valuation	Arith. Mean	Agg. Mean	Median			
Sioux County									
Agricultural	11	807,191	676,780	89.2	83.8	85.8	1.1	0.23	
Commercial	6	112,000	112,387	102.4	100.3	100.4	0.0	0.00	
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Comm. & Vac. Lots	6	112,000	112,387	102.4	100.3	100.4	0.0	0.00	
Residential	30	374,800	383,939	103.9	102.4	99.6	1.0	0.09	
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total Res. & Lakeshore	30	374,800	383,939	103.9	102.4	99.6	1.0	0.09	
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00	
Total County	47	1,293,991	1,173,106	100.2	90.7	99.8	1.1	0.11	

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

Slope County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	8	558,742	425,590	83.0	76.2	76.1	1.1	0.26
Commercial	4	85,875	79,263	90.6	92.3	100.0	0.0	0.00
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	4	85,875	79,263	90.6	92.3	100.0	0.0	0.00
Residential	14	105,998	83,473	89.1	78.7	96.0	1.1	0.29
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	14	105,998	83,473	89.1	78.7	96.0	1.1	0.29
Mobile Homes	1	62,050	62,045	100.0	100.0	100.0	0.0	0.00
Total County	27	812,665	650,371	87.9	80.0	93.5	1.1	0.26

Stark County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	14	1,078,226	608,300	57.6	56.4	53.6	1.0	0.18
Commercial	30	1,670,506	1,578,606	96.1	94.5	100.0	1.0	0.10
Vacant Lots	20	71,475	64,650	101.1	90.5	100.0	1.1	0.23
Total Comm. & Vac. Lots	50	1,741,981	1,643,256	98.1	94.3	100.0	1.0	0.15
Residential	37	1,927,425	1,789,521	94.7	92.8	90.6	1.0	0.07
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	37	1,927,425	1,789,521	94.7	92.8	90.6	1.0	0.07
Mobile Homes	15	149,722	103,945	66.2	69.4	64.6	1.0	0.30
Total County	116	4,897,354	4,145,022	88.0	84.6	90.1	1.0	0.20

City of Dickinson	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	30	2,532,104	2,457,300	100.4	97.0	97.5	1.0	0.12
Vacant Lots	5	32,500	29,200	83.7	89.8	71.4	0.0	0.00
Total Comm. & Vac. Lots	35	2,564,604	2,486,500	98.0	97.0	96.4	1.0	0.15
Residential	212	13,671,871	12,559,400	94.1	91.9	91.1	1.0	0.11
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	212	13,671,871	12,559,400	94.1	91.9	91.1	1.0	0.11
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	247	16,236,475	15,045,900	94.6	92.7	91.5	1.0	0.11

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Steele County								
Agricultural	8	674,863	568,290	94.3	84.2	92.1	1.1	0.28
Commercial	13	219,800	227,224	101.5	103.4	97.5	1.0	0.12
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	13	219,800	227,224	101.5	103.4	97.5	1.0	0.12
Residential	35	597,951	461,477	121.0	77.2	83.8	1.6	0.66
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	35	597,951	461,477	121.0	77.2	83.8	1.6	0.66
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total County	56	1,492,614	1,256,991	112.7	84.2	95.5	1.3	0.44

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Stutsman County								
Agricultural	34	2,361,073	1,819,600	81.2	77.1	80.3	1.1	0.18
Commercial	30	1,166,250	1,171,800	100.7	100.5	100.0	1.0	0.13
Vacant Lots	7	43,750	35,200	105.3	80.5	102.2	0.0	0.00
Total Comm. & Vac. Lots	37	1,210,000	1,207,000	101.6	99.8	100.0	1.0	0.18
Residential	42	1,651,201	1,476,400	114.3	89.4	93.6	1.3	0.37
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	42	1,651,201	1,476,400	114.3	89.4	93.6	1.3	0.37
Mobile Homes	63	1,399,537	1,204,672	82.4	86.1	83.3	1.0	0.20
Total County	176	6,621,811	5,707,672	93.8	86.2	87.5	1.1	0.25

	Total Sales	Verified Price	-----Sales Ratio-----					
			Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
City of Jamestown								
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	32	5,302,126	4,988,900	92.8	94.1	93.9	1.0	0.20
Vacant Lots	17	372,873	165,700	57.1	44.4	50.3	1.3	0.45
Total Comm. & Vac. Lots	49	5,674,999	5,154,600	80.4	90.8	81.8	0.9	0.31
Residential	212	13,526,787	12,097,000	94.5	89.4	90.1	1.1	0.18
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	212	13,526,787	12,097,000	94.5	89.4	90.1	1.1	0.18
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	261	19,201,786	17,251,600	91.9	89.8	89.9	1.0	0.20

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

Towner County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	22	1,656,065	1,426,990	88.2	86.2	81.6	1.0	0.30
Commercial	23	707,500	676,815	98.3	95.7	97.5	1.0	0.23
Vacant Lots	2	700	700	266.7	100.0	266.7	0.0	0.00
Total Comm. & Vac. Lots	25	708,200	677,515	111.8	95.7	97.5	1.2	0.40
Residential	33	727,350	719,613	126.7	98.9	113.6	1.3	0.37
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	33	727,350	719,613	126.7	98.9	113.6	1.3	0.37
Mobile Homes	1	9,750	3,047	31.3	31.3	31.3	0.0	0.00
Total County	81	3,101,365	2,827,165	110.4	91.2	97.5	1.2	0.40

Traill County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	10	1,609,479	788,131	57.6	49.0	47.2	1.2	0.30
Commercial	31	1,619,446	1,607,902	112.4	99.3	98.2	1.1	0.36
Vacant Lots	9	46,700	37,976	95.5	81.3	83.1	1.2	0.39
Total Comm. & Vac. Lots	40	1,666,146	1,645,878	108.6	98.8	97.4	1.1	0.36
Residential	72	3,213,350	2,860,132	103.5	89.0	93.1	1.2	0.33
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	72	3,213,350	2,860,132	103.5	89.0	93.1	1.2	0.33
Mobile Homes	5	83,200	91,696	124.2	110.2	104.0	0.0	0.00
Total County	127	6,572,175	5,385,837	102.3	81.9	94.0	1.3	0.35

Walsh County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	37	4,105,753	2,668,500	76.8	65.0	68.9	1.2	0.39
Commercial	30	1,686,916	1,617,002	110.8	95.9	100.0	1.2	0.28
Vacant Lots	6	35,800	9,900	49.6	27.7	26.5	0.0	0.00
Total Comm. & Vac. Lots	36	1,722,716	1,626,902	100.6	94.4	100.0	1.1	0.35
Residential	47	1,734,666	1,437,240	124.8	82.9	91.5	1.5	0.62
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	47	1,734,666	1,437,240	124.8	82.9	91.5	1.5	0.62
Mobile Homes	14	271,766	258,577	150.4	95.1	100.3	1.6	0.68
Total County	134	7,834,901	5,991,219	107.7	76.5	90.9	1.4	0.50

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

City of Grafton	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	30	2,893,900	2,998,700	105.9	103.6	100.0	1.0	0.14
Vacant Lots	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Comm. & Vac. Lots	30	2,893,900	2,998,700	105.9	103.6	100.0	1.0	0.14
Residential	45	2,446,325	2,197,800	97.7	89.8	95.6	1.1	0.20
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	45	2,446,325	2,197,800	97.7	89.8	95.6	1.1	0.20
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	75	5,340,225	5,196,500	101.0	97.3	100.0	1.0	0.17

Ward County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	34	3,866,763	2,124,200	64.7	54.9	57.6	1.2	0.21
Commercial	34	2,330,707	2,029,600	106.5	87.1	94.1	1.2	0.38
Vacant Lots	44	732,930	572,800	106.8	78.2	73.1	1.4	0.71
Total Comm. & Vac. Lots	78	3,063,637	2,602,400	106.6	84.9	76.3	1.3	0.60
Residential	142	9,447,417	8,549,600	106.3	90.5	93.2	1.2	0.31
Lakeshore	20	823,400	433,400	55.8	52.6	56.0	1.1	0.32
Total Res. & Lakeshore	162	10,270,817	8,983,000	100.0	87.5	91.1	1.1	0.33
Mobile Homes	236	5,578,851	5,399,279	108.8	96.8	99.7	1.1	0.28
Total County	510	22,780,068	19,108,879	102.8	83.9	93.7	1.2	0.35

City of Minot	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	30	4,552,248	4,150,800	97.7	91.2	97.5	1.1	0.14
Vacant Lots	34	938,000	522,400	70.4	55.7	55.2	1.3	0.56
Total Comm. & Vac. Lots	64	5,490,248	4,673,200	83.2	85.1	79.3	1.0	0.39
Residential	469	40,848,578	40,899,800	98.5	100.1	97.9	1.0	0.08
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	469	40,848,578	40,899,800	98.5	100.1	97.9	1.0	0.08
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	533	46,338,826	45,573,000	96.7	98.3	97.7	1.0	0.12

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

Wells County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	26	2,167,085	1,561,100	75.1	72.0	73.1	1.0	0.17
Commercial	30	1,601,425	1,622,533	143.1	101.3	101.0	1.4	0.60
Vacant Lots	5	10,700	13,932	676.6	130.2	205.3	0.0	0.00
Total Comm. & Vac. Lots	35	1,612,125	1,636,465	219.3	101.5	101.9	2.2	1.36
Residential	42	1,205,450	1,135,692	178.2	94.2	95.1	1.9	1.08
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	42	1,205,450	1,135,692	178.2	94.2	95.1	1.9	1.08
Mobile Homes	4	110,250	82,745	64.0	75.1	63.3	0.0	0.00
Total County	107	5,094,910	4,416,002	162.3	86.7	93.7	1.9	0.99

Williams County	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	53	4,399,215	2,299,043	57.9	52.3	57.2	1.1	0.24
Commercial	30	1,483,770	1,468,096	104.4	98.9	97.6	1.1	0.21
Vacant Lots	18	140,800	67,296	78.9	47.8	57.1	1.7	0.80
Total Comm. & Vac. Lots	48	1,624,570	1,535,392	94.8	94.5	92.5	1.0	0.38
Residential	49	2,428,507	2,300,368	107.9	94.7	96.2	1.1	0.28
Lakeshore	9	336,500	248,580	72.7	73.9	82.5	1.0	0.20
Total Res. & Lakeshore	58	2,765,007	2,548,948	102.4	92.2	93.0	1.1	0.28
Mobile Homes	18	203,500	193,196	99.0	94.9	98.6	1.0	0.35
Total County	177	8,992,292	6,576,579	86.7	73.1	82.4	1.2	0.38

City of Williston	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	0	0	0	0.0	0.0	0.0	0.0	0.00
Commercial	37	3,675,123	3,325,000	98.9	90.5	99.2	1.1	0.13
Vacant Lots	6	109,000	60,600	89.5	55.6	58.8	0.0	0.00
Total Comm. & Vac. Lots	43	3,784,123	3,385,600	97.6	89.5	98.4	1.1	0.18
Residential	203	11,269,600	10,715,900	97.9	95.1	96.4	1.0	0.12
Lakeshore	0	0	0	0.0	0.0	0.0	0.0	0.00
Total Res. & Lakeshore	203	11,269,600	10,715,900	97.9	95.1	96.4	1.0	0.12
Mobile Homes	0	0	0	0.0	0.0	0.0	0.0	0.00
Total City	246	15,053,723	14,101,500	97.9	93.7	96.7	1.0	0.13

Table 1 Continued
1999 Real Estate Assessment / Sales Ratio Study

State	-----Sales Ratio-----							
	Total Sales	Verified Price	Assessed Valuation	Arith. Mean	Agg. Mean	Median	PRD	COD
Agricultural	1054	96629106	62958192	72.5	65.2	67.2	1.1	0.28
Commercial	1636	168581483	163436990	105.1	96.9	100.0	1.1	0.19
Vacant Lots	634	9,022,822	5,885,159	100.7	65.2	75.0	1.5	0.74
Total Comm. & Vac. Lots	2,270	177,604,305	169,322,149	103.9	95.3	99.2	1.1	0.31
Residential	7047	505886503	469065545	100.4	92.7	94.0	1.1	0.19
Lakeshore	132	4601256	2588765	57.7	56.3	53.5	1.0	0.43
Total Res. & Lakeshore	7,179	510,487,759	471,654,310	99.6	92.4	93.9	1.1	0.19
Mobile Homes	1019	22270483	20369050	109.5	91.5	92.8	1.2	0.41
Total State	11,522	806,991,653	724,303,701	98.9	89.8	93.3	1.1	0.25

TABLE 2
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales
		45	49	54	59	64	69	74	79	84	89	94	99	104	109	114	119	124	129	134	139	140	
Adams-	Township	3	3	2	2	4	1	3	1	1	2	0	1	0	2	0	0	0	0	0	0	0	25
	Urban	0	0	0	0	0	0	0	2	2	4	4	13	25	4	4	3	0	1	0	0	5	67
Barnes-	Township	6	2	0	3	3	3	3	4	2	3	3	2	1	0	0	0	0	0	0	0	2	37
	Urban	2	2	1	1	0	3	1	3	6	2	2	5	10	1	5	2	3	1	1	0	15	66
Valley City-	Urban	0	0	0	0	0	1	0	0	1	6	22	27	31	10	8	1	2	1	1	1	1	113
Benson-	Township	2	1	2	3	1	2	3	3	3	3	1	3	0	0	0	1	0	0	1	0	1	30
	Urban	0	1	1	1	1	1	2	1	7	1	7	8	18	5	2	2	0	0	0	1	18	77
Billings-	Township	1	1	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	4
	Urban	0	0	0	0	1	0	0	0	1	2	2	0	12	0	0	0	0	0	1	0	0	19
Bottineau-	Township	40	2	13	5	7	9	4	4	1	6	1	4	1	4	0	0	0	0	0	0	4	105
	Urban	0	1	2	0	2	3	5	3	7	5	3	8	13	5	4	1	1	4	0	1	9	77
Bowman-	Township	4	2	0	3	1	3	0	2	1	0	0	0	2	0	0	1	0	0	0	0	0	19
	Urban	0	1	0	1	2	1	2	5	4	2	1	5	1	2	2	0	0	2	2	3	6	42
Burke-	Township	0	0	0	0	1	1	0	1	2	1	2	0	0	0	0	0	0	0	0	0	1	9
	Urban	1	1	0	1	0	1	0	2	2	0	3	16	16	4	4	0	2	0	0	0	0	55
Burleigh-	Township	0	0	0	0	0	0	1	0	2	10	20	27	13	9	4	2	3	1	0	0	0	92
	Urban	0	0	1	2	6	9	3	4	11	13	25	21	25	11	8	4	1	1	0	0	2	147
Bismarck-	Urban	0	0	0	0	0	0	4	16	61	129	205	188	93	35	11	3	0	0	1	0	0	746
Cass-	Township	42	11	13	9	9	13	13	12	14	10	11	13	14	4	2	1	0	3	1	0	3	198
	Urban	14	2	9	10	16	17	17	31	26	25	34	29	27	13	14	8	6	5	7	2	46	358
Fargo-	Urban	0	0	0	0	1	5	40	126	189	275	242	183	99	64	23	14	6	5	5	0	8	1,285

TABLE 2 Continued
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales	
		45	49	54	59	64	69	74	79	84	89	94	99	104	109	114	119	124	129	134	139	140		
West Fargo-	Urban	3	3	1	2	2	4	3	17	29	50	49	77	59	23	11	8	13	4	0	0	2	360	
Cavalier-	Township	2	2	7	6	7	0	2	2	1	0	0	0	0	0	0	0	0	0	0	0	0	29	
	Urban	0	0	1	0	2	3	2	2	3	5	7	19	5	7	5	5	4	3	4	2	8	87	
Dickey-	Township	2	3	1	1	3	4	2	6	7	6	3	2	1	1	1	0	1	0	0	1	1	46	
	Urban	3	1	1	1	1	4	3	11	5	5	7	12	6	1	5	3	2	3	2	1	10	87	
Divide-	Township	1	2	1	5	5	0	2	2	0	0	0	0	0	0	1	0	0	0	0	0	0	19	
	Urban	1	1	1	2	1	0	6	2	1	4	4	5	2	3	3	2	0	0	2	1	11	52	
Dunn-	Township	3	4	5	1	1	1	1	0	0	0	2	1	2	1	0	0	0	0	0	1	0	23	
	Urban	1	0	0	0	0	0	0	2	1	2	2	5	7	14	4	0	3	0	2	2	1	1	47
Eddy-	Township	0	0	2	0	0	1	0	0	0	0	1	1	2	2	0	0	0	0	0	1	0	10	
	Urban	0	0	0	1	1	2	3	4	6	7	7	10	29	2	2	1	1	1	1	1	3	82	
Emmons-	Township	4	2	1	1	2	0	3	0	0	0	0	4	4	1	0	0	0	0	0	0	0	5	27
	Urban	0	1	0	0	0	1	2	3	3	6	4	11	5	3	5	2	0	4	1	0	0	7	58
Foster-	Township	0	0	0	1	1	2	2	0	0	0	1	1	1	0	0	0	0	0	0	0	0	9	
	Urban	0	0	0	1	0	3	0	1	5	2	2	6	36	1	3	1	1	0	0	0	0	1	63
Golden Valley-	Township	1	0	0	0	0	1	0	2	2	0	1	2	0	0	0	0	0	0	0	0	0	9	
	Urban	0	0	0	0	0	1	0	0	4	3	4	8	20	4	3	1	0	1	2	0	3	54	
Grand Forks-	Township	15	6	4	2	6	9	8	3	7	8	6	4	5	1	0	0	2	1	0	2	12	101	
	Urban	14	3	6	4	7	7	7	11	13	27	26	18	27	9	12	3	5	2	2	1	33	237	
Grand Forks-	Urban	0	0	0	0	1	4	22	21	52	107	121	99	56	32	16	4	4	4	2	1	3	549	
Grant-	Township	2	1	3	2	4	1	1	4	2	1	1	1	0	0	1	0	0	0	0	0	0	24	
	Urban	0	0	0	0	1	0	0	0	3	3	6	9	11	4	2	2	0	0	0	0	1	42	

TABLE 2 Continued
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales
		45	49	54	59	64	69	74	79	84	89	94	99	104	109	114	119	124	129	134	139	140	
Griggs-	Township	0	0	0	1	0	2	1	1	1	0	0	1	0	0	0	0	0	0	0	0	0	8
	Urban	0	0	0	1	0	0	2	0	1	3	11	16	14	5	3	2	0	0	0	0	1	59
Hettinger-	Township	4	1	4	2	2	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16
	Urban	0	1	0	0	1	0	2	2	3	1	3	8	15	6	1	0	2	0	0	0	0	45
Kidder-	Township	1	0	1	0	3	0	1	0	0	0	3	3	0	0	0	0	0	0	0	0	0	12
	Urban	0	0	0	0	1	1	2	0	1	3	4	4	3	6	2	3	1	0	3	0	11	45
LaMoure-	Township	1	3	0	1	4	1	0	3	2	2	2	2	0	0	0	0	1	0	0	0	0	22
	Urban	0	1	0	1	3	0	1	0	5	3	7	7	10	9	3	8	1	0	3	1	4	67
Logan-	Township	0	0	3	5	1	3	0	3	0	0	1	1	0	0	0	0	0	0	1	0	0	18
	Urban	0	0	1	0	0	1	2	3	3	1	8	9	13	3	0	2	0	0	1	0	5	52
McHenry-	Township	2	0	0	0	1	3	1	3	3	0	3	2	3	2	1	0	1	0	0	1	1	27
	Urban	3	3	5	3	1	5	3	3	3	5	3	6	16	3	1	0	1	3	1	1	7	76
McIntosh-	Township	1	1	1	3	8	3	5	4	13	5	1	2	3	0	2	2	1	1	0	0	1	57
	Urban	0	2	1	1	2	2	2	3	4	5	7	4	5	0	4	3	1	2	0	0	10	58
McKenzie-	Township	3	2	5	4	0	3	0	1	1	1	3	2	0	1	0	0	0	0	0	0	1	27
	Urban	0	0	0	0	0	1	1	0	3	5	7	13	16	4	5	3	1	3	1	1	4	68
McLean-	Township	13	5	7	5	12	10	6	9	8	4	3	0	3	1	2	0	1	2	1	1	5	98
	Urban	4	2	2	3	4	3	6	8	7	10	10	4	15	4	10	7	1	8	2	2	25	137
Mercer-	Township	1	3	0	2	1	1	3	3	3	0	2	2	1	1	0	0	0	0	0	0	3	26
	Urban	2	2	0	5	4	4	6	22	17	7	15	19	21	6	3	2	2	2	1	2	25	167
Morton-	Township	7	2	6	7	12	4	11	3	10	3	5	3	7	2	1	1	0	0	0	0	0	84
	Urban	3	1	5	10	7	18	14	7	9	5	6	8	20	2	4	4	0	3	2	1	25	154

TABLE 2 Continued
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales
		45	49	54	59	64	69	74	79	84	89	94	99	104	109	114	119	124	129	134	139	140	
Mandan-	Urban	5	3	3	7	4	1	4	13	27	40	37	49	16	9	2	2	3	2	1	0	2	230
Mountrail-	Township	2	3	1	1	2	0	1	3	0	2	0	0	0	0	0	0	0	0	0	0	0	15
	Urban	3	1	0	1	1	1	1	7	1	5	5	10	34	1	0	1	2	3	0	0	4	81
Nelson-	Township	1	0	1	0	0	1	0	1	2	0	1	0	0	2	1	1	0	1	0	0	2	14
	Urban	1	1	1	3	2	4	6	2	2	1	3	3	1	2	1	1	1	1	1	4	17	59
Oliver-	Township	2	3	1	2	1	1	2	0	1	1	1	0	0	0	0	0	0	0	0	0	0	15
	Urban	0	0	1	2	0	0	1	3	1	4	3	5	2	8	1	1	1	1	2	1	7	44
Pembina-	Township	6	4	5	4	2	3	5	1	0	5	2	3	3	1	0	0	1	1	1	0	2	49
	Urban	11	1	0	3	1	3	3	6	11	10	6	10	9	6	7	3	4	3	5	0	13	115
Pierce-	Township	0	0	0	1	1	3	1	2	1	0	0	1	0	0	1	0	0	1	0	0	1	13
	Urban	0	1	1	0	2	5	4	1	9	11	5	10	15	2	4	4	1	0	2	0	3	80
Ramsey-	Township	7	1	4	4	2	5	4	5	8	4	6	9	2	1	0	1	3	3	0	1	4	74
	Urban	0	1	2	3	1	1	1	4	1	4	6	8	14	3	2	0	1	1	0	1	9	63
Devils Lake-	Urban	2	0	0	2	1	3	4	4	8	17	13	14	11	5	7	5	2	4	2	1	13	118
Ransom-	Township	0	1	1	1	3	1	3	5	1	2	0	0	2	1	0	0	0	1	0	3	25	
	Urban	1	0	1	3	5	2	6	5	11	3	5	10	13	4	2	0	4	2	2	1	12	92
Renville-	Township	1	2	2	3	3	2	1	0	0	1	0	1	0	2	0	0	0	0	0	0	0	18
	Urban	0	0	0	1	0	1	1	5	5	2	6	3	5	4	0	4	1	0	1	1	12	52
Richland-	Township	6	7	5	3	5	6	0	3	3	5	2	6	3	0	1	0	0	1	0	0	0	56
	Urban	1	0	1	1	3	4	0	11	3	8	6	10	18	6	8	3	2	1	2	1	11	100
Wahpeton-	Urban	2	0	1	1	1	1	1	2	1	16	13	15	15	7	7	3	2	1	3	4	4	114

TABLE 2 Continued
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales
		45	49	54	59	64	69	74	79	84	89	94	99	104	109	114	119	124	129	134	139	140	
Rolette-	Township	5	2	0	1	1	1	2	2	1	1	0	0	1	1	1	0	1	1	0	0	2	23
	Urban	3	1	0	5	1	3	2	2	7	5	10	9	8	6	7	2	4	4	1	0	10	90
Sargent-	Township	2	2	1	2	3	5	7	3	6	1	0	1	0	1	0	0	0	1	0	0	0	35
	Urban	1	1	1	3	3	2	2	5	3	2	4	9	7	4	2	2	0	0	2	1	6	60
Sheridan-	Township	0	0	0	0	0	1	2	6	0	2	2	0	2	0	0	0	0	1	0	0	0	16
	Urban	0	0	2	0	1	2	0	3	1	3	3	5	7	3	0	1	3	0	1	1	5	41
Sioux-	Township	0	0	0	1	1	1	0	1	1	1	1	0	0	2	1	0	0	0	1	0	0	11
	Urban	0	0	0	0	0	0	0	1	0	1	2	14	10	2	3	1	0	1	0	0	1	36
Slope-	Township	0	0	1	0	1	1	1	1	1	0	0	2	0	0	0	0	0	0	0	0	2	10
	Urban	1	0	2	0	3	1	0	0	0	0	1	1	5	1	1	1	0	0	0	0	0	17
Stark-	Township	1	5	4	2	1	0	2	4	3	9	7	1	3	1	3	2	0	0	0	0	0	48
	Urban	4	0	1	1	3	1	1	3	2	10	7	3	20	2	0	1	2	3	1	0	3	68
Dickinson-	Urban	0	0	0	0	0	3	2	7	60	42	41	34	23	9	6	5	1	5	2	2	5	247
Steele-	Township	0	0	1	1	0	0	0	1	0	0	2	0	0	0	1	0	1	0	0	0	2	9
	Urban	1	0	2	4	2	4	2	0	5	1	1	5	2	1	2	1	2	2	3	0	7	47
Stutsman-	Township	0	0	1	2	10	6	2	7	11	6	9	2	3	2	1	0	1	2	1	0	3	69
	Urban	0	3	4	6	1	2	10	3	14	10	11	4	12	5	2	5	2	0	3	0	10	107
Jamestown-	Urban	9	5	3	6	4	11	15	14	34	33	31	23	30	8	10	7	1	1	2	3	11	261
Towner-	Township	2	0	3	1	3	2	2	2	3	1	1	1	1	0	2	0	0	0	1	1	1	27
	Urban	3	0	0	1	1	1	0	1	3	5	3	3	3	6	3	4	2	3	1	0	11	54
Traill-	Township	4	2	3	1	0	1	1	0	0	2	1	2	1	1	0	0	0	0	0	0	1	20
	Urban	3	2	2	2	3	9	6	6	6	4	8	13	7	0	4	3	5	0	2	2	20	107

TABLE 2 Continued
FREQUENCY DISTRIBUTION TABLE SHOWING THE NUMBER OF SAMPLES WITHIN A GIVEN PERCENTAGE GROUPING

County - City		Under 45	45	50	55	60	65	70	75	80	85	90	95	100	105	110	115	120	125	130	135	Over 140	Total Sales
Walsh-	Township	9	7	2	3	2	4	3	1	1	5	1	2	1	1	2	0	0	0	1	0	5	50
	Urban	2	1	1	4	4	4	3	5	2	2	9	4	10	4	1	3	3	1	0	2	19	84
Grafton-	Urban	0	0	0	1	1	1	7	7	4	3	3	8	20	1	4	1	3	1	2	1	7	75
Ward-	Township	16	2	13	17	12	14	11	20	15	8	15	15	24	6	3	7	4	2	2	1	17	224
	Urban	6	4	4	6	7	11	15	14	15	16	21	41	46	10	13	5	3	3	5	4	37	286
Minot-	Urban	12	1	3	4	4	2	5	16	38	45	88	111	92	51	25	12	7	4	4	5	4	533
Wells-	Township	3	0	2	3	3	2	8	0	0	5	3	0	0	0	0	1	0	0	0	0	3	33
	Urban	2	3	0	2	0	3	3	3	2	5	7	3	11	5	1	1	0	2	0	2	19	74
Williams-	Township	21	9	8	8	10	3	3	9	8	3	7	3	9	2	1	2	2	2	1	0	3	114
	Urban	4	1	0	0	2	2	2	3	1	7	3	9	4	1	2	3	2	3	2	1	11	63
Williston-	Urban	0	2	1	3	5	2	6	8	19	19	39	50	40	15	11	6	3	5	2	1	9	246
Total State-	Township	249	109	140	135	165	147	136	154	154	130	138	132	118	56	33	23	22	24	13	10	91	2,179
Total State-	Urban	128	61	75	126	134	195	279	477	810	1,065	1,273	1,378	1,300	485	327	198	128	123	103	64	613	9,342
Grand Total-		377	170	215	261	299	342	415	631	964	1,195	1,411	1,510	1,418	541	360	221	150	147	116	74	704	11,521

Table 3
Characteristics of the Sample

County	Residential				Commercial			
	1998 Sales	Old Sales	Appraisals	Total	1998 Sales	Old Sales	Appraisals	Total
Adams	21	24	0	45	0	3	17	20
Barnes	36	0	0	36	0	3	27	30
City of Valley City	83	0	0	83	3	12	15	30
Benson	17	25	0	42	3	6	22	31
Billings	1	0	10	11	0	0	8	8
Bottineau	52	0	0	52	7	11	12	30
Bowman	33	0	0	33	5	9	0	14
Burke	14	16	0	30	1	2	19	22
Burleigh	85	0	0	85	2	4	12	18
City of Bismarck	714	0	0	714	32	0	0	32
Cass	245	0	0	245	15	15	0	30
City of Fargo	1,246	0	0	1,246	39	0	0	39
City of West Fargo	263	0	0	263	8	25	0	33
Cavalier	27	27	0	54	0	10	21	31
Dickey	55	0	0	55	8	14	8	30
Divide	18	16	0	34	0	7	7	14
Dunn	8	23	0	31	0	7	7	14
Eddy	25	33	0	58	0	1	21	22
Emmons	34	0	0	34	4	5	18	27
Foster	35	0	0	35	0	2	26	28
Golden Valley	12	31	0	43	1	2	8	11
Grand Forks	114	0	0	114	11	17	2	30
City of Grand Forks	512	0	0	512	37	0	0	37
Grant	4	25	1	30	1	7	2	10
Griggs	11	28	0	39	0	2	17	19
Hettinger	17	14	0	31	1	4	9	14
Kidder	12	19	0	31	2	4	8	14
LaMoure	19	16	0	35	2	1	30	33
Logan	30	0	0	30	4	9	4	17
McHenry	32	0	0	32	2	11	17	30
McIntosh	18	16	0	34	2	18	0	20
McKenzie	22	29	0	51	6	15	0	21
McLean	94	0	0	94	11	22	0	33

Table 3 Continued
Characteristics of the Sample

County	Residential				Commercial			
	1998 Sales	Old Sales	Appraisals	Total	1998 Sales	Old Sales	Appraisals	Total
Mercer	117	0	0	117	1	2	27	30
Morton	78	0	0	78	5	13	12	30
City of Mandan	170	0	0	170	13	18	0	31
Mountrail	24	18	0	42	1	2	27	30
Nelson	40	0	0	40	4	15	0	19
Oliver	11	31	0	42	1	2	1	4
Pembina	84	0	0	84	5	31	0	36
Pierce	45	0	0	45	5	12	12	29
Ramsey	34	0	0	34	4	5	3	12
City of Devils Lake	83	0	0	83	12	19	0	31
Ransom	61	0	0	61	1	16	14	31
Renville	14	18	0	32	1	6	13	20
Richland	62	0	0	62	1	17	13	31
City of Wahpeton	69	0	0	69	16	19	5	40
Rolette	27	31	0	58	1	4	23	28
Sargent	47	0	0	47	2	7	7	16
Sheridan	9	28	0	37	2	1	3	6
Sioux	1	6	23	30	0	0	6	6
Slope	2	10	2	14	0	1	3	4
Stark	37	0	0	37	2	9	19	30
City of Dickinson	212	0	0	212	2	22	6	30
Steele	15	20	0	35	1	0	12	13
Stutsman	42	0	0	42	2	9	19	30
City of Jamestown	212	0	0	212	16	16	0	32
Towner	33	0	0	33	7	6	10	23
Traill	72	0	0	72	14	17	0	31
Walsh	47	0	0	47	8	20	2	30
City of Grafton	45	0	0	45	6	15	9	30
Ward	142	0	0	142	10	24	0	34
City of Minot	469	0	0	469	30	0	0	30
Wells	42	0	0	42	4	12	14	30
Williams	49	0	0	49	6	20	4	30
City of Williston	203	0	0	203	37	0	0	37
County Total	2,226	504	36	2,766	176	462	566	1,204
City Total	4,281	0	0	4,281	251	146	35	432
State Total	6,507	504	36	7,047	427	608	601	1,636

Table 4
Median Ratios and Coefficients of Dispersion for Residential Property

County	Residential									
	Median Ratio					COD				
	1995	1996	1997	1998	1999	1995	1996	1997	1998	1999
Adams	94.1	97.7	102.3	99.5	99.4	0.18	0.14	0.14	0.12	0.31
Barnes	100.0	100.4	83.2	95.2	97.5	0.45	0.35	0.40	0.31	0.42
City of Valley City	100.7	98.5	97.1	95.6	97.7	0.07	0.09	0.13	0.09	0.07
Benson	102.8	95.8	99.8	95.1	99.7	0.29	0.21	0.20	0.32	0.27
Billings	100.0	100.0	100.0	100.0	100.0	0.13	0.05	0.03	0.02	0.04
Bottineau	97.8	91.4	94.1	97.7	95.8	0.91	0.49	0.37	0.48	0.22
Bowman	96.5	96.2	90.9	91.3	98.2	0.14	0.13	0.22	0.14	0.33
Burke	106.7	100.9	100.2	100.0	101.5	0.14	0.10	0.09	0.10	0.16
Burleigh	92.4	90.6	95.6	90.1	96.9	0.08	0.08	0.10	0.06	0.06
City of Bismarck	90.1	94.7	93.7	94.5	94.4	0.06	0.05	0.05	0.05	0.06
Cass	87.4	87.6	90.1	90.6	91.5	0.24	0.21	0.23	0.20	0.21
City of Fargo	94.0	93.3	91.8	93.3	90.0	0.09	0.09	0.10	0.09	0.09
City of West Fargo	91.1	93.1	94.9	94.8	94.9	0.10	0.09	0.08	0.09	0.08
Cavalier	96.3	89.8	95.1	101.3	103.6	0.36	0.38	0.17	0.32	0.34
Dickey	95.2	94.3	93.8	98.0	89.4	0.34	0.20	0.34	0.29	0.68
Divide	96.5	98.9	98.0	97.1	99.4	0.53	0.81	0.99	0.63	0.66
Dunn	101.6	100.7	101.4	99.8	98.1	0.16	0.11	0.12	0.21	0.22
Eddy	102.8	100.0	97.7	94.8	94.7	0.23	0.18	0.17	0.17	0.15
Emmons	97.8	87.4	98.4	96.7	96.9	0.27	0.35	0.39	0.24	0.35
Foster	97.7	93.3	91.6	92.7	98.2	0.21	0.17	0.17	0.18	0.13
Golden Valley	102.5	101.0	99.5	102.5	101.5	0.32	0.27	0.20	0.18	0.13
Grand Forks	80.9	85.5	89.5	84.3	91.8	0.38	0.25	0.32	0.28	0.28
City of Grand Forks	90.9	93.5	92.2	96.2	92.6	0.09	0.09	0.10	0.09	0.08
Grant	103.8	103.6	100.4	98.9	97.8	0.15	0.14	0.11	0.10	0.08
Griggs	98.5	98.2	97.0	98.2	99.3	0.18	0.08	0.10	0.08	0.07
Hettinger	110.0	100.5	100.1	97.5	95.5	0.29	0.13	0.17	0.20	0.13
Kidder	93.9	86.9	85.3	92.7	106.2	0.35	0.33	0.31	0.25	0.97
LaMoure	92.4	98.6	91.1	89.6	102.5	0.17	0.15	0.18	0.21	0.19
Logan	100.0	95.1	100.0	101.7	99.4	0.16	0.34	0.11	0.14	0.19
McHenry	96.7	97.7	98.4	84.2	84.0	0.75	0.50	0.81	0.46	0.33
McIntosh	99.2	102.8	98.2	95.2	98.2	0.17	0.15	0.18	0.22	0.29
McKenzie	100.3	100.0	101.4	99.8	100.1	0.18	0.13	0.13	0.10	0.10
McLean	96.3	85.8	95.8	87.3	100.3	0.51	0.40	0.41	0.35	0.84

Table 4 Continued
Median Ratios and Coefficients of Dispersion for Residential Property

County	Median Ratio					COD				
	1995	1996	1997	1998	1999	1995	1996	1997	1998	1999
Mercer	98.3	97.7	97.8	98.3	88.9	0.18	0.23	0.16	0.24	0.42
Morton	96.2	96.6	96.3	93.6	96.0	0.66	0.74	0.53	0.29	0.34
City of Mandan	89.4	92.1	94.0	92.8	92.0	0.83	0.13	0.10	0.09	0.07
Mountrail	88.5	92.2	92.5	102.1	97.1	0.30	0.35	0.35	0.25	0.27
Nelson	102.7	101.3	101.9	101.9	100.0	0.38	0.34	0.64	0.82	0.86
Oliver	97.7	94.3	105.3	121.2	98.9	0.25	0.37	0.35	0.31	0.24
Pembina	95.2	97.5	88.6	91.8	91.7	0.37	0.37	0.40	0.31	0.26
Pierce	102.3	87.1	88.3	92.9	93.4	0.31	0.20	0.25	0.37	0.15
Ramsey	92.6	96.7	93.4	94.6	96.2	0.26	0.13	0.26	0.28	0.21
City of Devils Lake	95.2	90.9	90.3	92.2	96.4	0.15	0.15	0.18	0.16	0.16
Ransom	92.6	93.4	101.3	92.0	87.1	0.44	0.54	0.55	0.35	0.35
Renville	95.3	101.7	95.3	95.8	102.2	0.58	0.41	0.53	0.78	0.61
Richland	88.5	90.9	78.2	95.7	95.1	0.50	0.34	0.28	0.26	0.21
City of Wahpeton	101.2	88.0	92.5	90.5	97.1	0.20	0.16	0.15	0.16	0.15
Rolette	101.7	97.9	93.4	95.6	98.8	0.26	0.33	0.37	0.17	0.20
Sargent	102.8	88.1	99.2	92.8	98.0	0.74	0.49	0.32	0.36	0.28
Sheridan	97.6	100.4	100.2	98.3	96.7	0.38	0.31	0.31	0.25	0.22
Sioux	100.0	100.3	100.2	100.0	99.6	0.11	0.19	0.19	0.21	0.09
Slope	100.0	100.0	100.0	91.6	96.0	0.70	0.41	0.17	0.20	0.29
Stark	96.9	97.3	93.2	86.4	90.6	0.24	0.19	0.68	0.21	0.07
City of Dickinson	89.7	88.1	90.7	87.2	91.1	0.16	0.12	0.11	0.11	0.11
Steele	106.8	101.9	100.5	93.5	83.8	0.96	0.47	0.41	0.39	0.66
Stutsman	97.6	96.1	91.4	97.7	93.6	0.34	0.22	0.17	0.21	0.37
City of Jamestown	87.8	90.5	91.9	90.6	90.1	0.17	0.18	0.20	0.23	0.18
Towner	98.8	87.3	84.5	97.6	113.6	0.31	0.29	0.24	0.23	0.37
Traill	89.5	84.1	87.5	91.2	93.1	0.42	0.44	0.54	0.38	0.33
Walsh	97.4	94.6	100.0	93.0	91.5	0.27	0.29	0.35	0.49	0.62
City of Grafton	99.4	97.4	99.6	94.4	95.6	0.08	0.16	0.10	0.43	0.20
Ward	88.9	86.0	90.9	91.3	93.2	0.45	0.27	0.31	0.37	0.31
City of Minot	92.5	91.6	92.1	95.3	97.9	0.32	0.11	0.10	0.09	0.08
Wells	100.5	86.2	91.7	102.7	95.1	0.73	0.53	0.29	0.41	1.08
Williams	94.2	91.9	89.9	85.6	96.2	0.32	0.24	0.25	0.31	0.28
City of Williston	88.8	91.6	91.0	94.0	96.4	0.13	0.12	0.13	0.12	0.12
State	92.9	93.3	93.3	94.1	94.0	0.24	0.19	0.20	0.19	0.19

Table 5
Median Ratios and Coefficients of Dispersion for Commercial Property

County	Commercial					Commercial				
	Median Ratio					COD				
	1995	1996	1997	1998	1999	1995	1996	1997	1998	1999
Adams	105.0	105.0	100.0	100.0	100.0	0.31	0.31	0.02	0.01	0.01
Barnes	100.0	100.3	98.7	100.0	100.0	0.18	0.16	0.11	0.12	0.15
City of Valley City	100.0	100.1	100.3	100.9	100.6	0.05	0.05	0.04	0.05	0.34
Benson	100.0	100.0	100.0	100.0	100.0	0.13	0.11	0.23	0.08	0.23
Billings	100.0	100.0	100.0	100.0	97.1	0.00	0.07	0.08	0.02	0.09
Bottineau	106.9	101.6	100.7	104.3	100.9	0.32	0.44	0.20	0.28	0.17
Bowman	99.9	100.0	101.7	92.4	93.5	0.21	0.46	0.44	0.27	0.29
Burke	98.9	99.1	99.7	99.8	99.9	0.04	0.16	0.04	0.05	0.05
Burleigh	100.8	100.5	100.5	100.7	99.5	0.20	0.22	0.18	0.18	0.08
City of Bismarck	92.9	96.2	95.7	96.8	94.0	0.08	0.11	0.08	0.07	0.10
Cass	100.0	100.0	97.9	97.5	94.6	0.54	0.46	0.32	0.33	0.39
City of Fargo	96.1	100.3	97.6	96.2	94.0	0.16	0.17	0.25	0.22	0.18
City of West Fargo	95.8	97.1	99.9	99.4	96.2	0.16	0.16	0.13	0.14	0.14
Cavalier	96.5	101.3	99.7	98.6	98.0	0.14	0.12	0.15	0.15	0.12
Dickey	100.0	102.1	104.1	98.9	97.7	0.42	0.42	0.33	0.29	0.27
Divide	123.4	101.3	111.5	100.4	97.7	0.50	0.44	0.59	0.47	0.42
Dunn	103.2	102.0	102.0	100.2	100.0	0.05	0.04	0.04	0.04	0.02
Eddy	100.0	100.0	100.0	100.0	100.0	0.05	0.03	0.03	0.02	0.01
Emmons	100.0	102.4	100.0	99.8	100.0	0.08	0.14	0.13	0.09	0.14
Foster	100.0	100.0	100.0	100.0	100.0	0.01	0.01	0.01	0.00	0.00
Golden Valley	100.0	100.0	100.0	100.0	100.0	0.05	0.00	0.03	0.00	0.01
Grand Forks	100.0	100.0	100.0	100.0	104.1	0.41	0.31	0.28	0.70	0.65
City of Grand Forks	97.8	97.8	97.4	94.9	96.5	0.13	0.08	0.10	0.10	0.13
Grant	98.6	100.8	99.6	100.6	101.0	0.30	0.17	0.06	0.07	0.05
Griggs	98.4	98.3	100.2	98.4	98.8	0.07	0.06	0.07	0.10	0.06
Hettinger	100.4	101.2	100.2	101.2	100.8	0.05	0.05	0.03	0.04	0.02
Kidder	93.8	93.4	97.1	97.6	104.1	0.37	0.17	0.19	0.22	0.14
LaMoure	101.8	101.8	102.3	101.1	102.7	0.14	0.12	0.12	0.14	0.11
Logan	102.9	100.0	100.0	96.9	95.0	0.16	0.12	0.16	0.14	0.12
McHenry	100.1	100.0	102.2	102.0	100.3	0.34	0.39	0.29	0.19	0.19
McIntosh	100.1	102.0	100.6	98.1	97.5	0.13	0.12	0.13	0.13	0.16
McKenzie	100.0	100.2	100.0	100.1	98.5	0.29	0.16	0.09	0.12	0.16
McLean	100.0	104.3	99.3	100.0	100.0	0.36	0.35	0.80	0.59	0.35

Table 5 Continued
Median Ratios and Coefficients of Dispersion for Commercial Property

County	Commercial					Commercial				
	Median Ratio					COD				
	1995	1996	1997	1998	1999	1995	1996	1997	1998	1999
Mercer	100.0	99.6	99.2	98.4	100.0	0.02	0.02	0.02	0.02	0.03
Morton	104.4	100.8	101.1	100.0	100.0	0.43	0.49	0.65	0.18	0.23
City of Mandan	99.4	95.5	96.3	94.6	93.7	0.17	0.14	0.10	0.12	0.13
Mountrail	100.0	100.0	100.0	100.0	100.0	0.11	0.55	0.05	0.04	0.02
Nelson	100.5	97.4	103.9	103.9	103.9	0.30	0.33	0.36	0.40	0.41
Oliver	96.6	103.8	100.6	123.3	104.2	0.19	0.00	0.13	0.00	0.00
Pembina	100.4	101.8	100.0	99.8	100.0	0.38	0.33	0.41	0.35	0.39
Pierce	96.0	96.4	96.8	99.3	100.9	0.26	0.26	0.26	0.13	0.13
Ramsey	100.0	100.0	100.0	100.0	100.0	0.03	0.03	0.03	0.04	0.08
City of Devils Lake	102.0	102.6	100.0	101.3	101.6	0.20	0.20	0.21	0.21	0.27
Ransom	103.6	104.7	99.4	100.8	100.0	0.16	0.17	0.19	0.21	0.16
Renville	102.4	97.8	96.2	97.8	103.8	0.17	0.20	0.16	0.12	0.12
Richland	98.8	100.0	96.9	97.3	100.0	0.20	0.19	0.17	0.19	0.12
City of Wahpeton	100.0	100.8	100.0	100.0	95.6	0.36	0.33	0.31	0.26	0.18
Rolette	102.2	99.3	102.2	99.7	97.7	0.14	0.16	0.17	0.28	0.33
Sargent	96.9	97.3	98.4	100.5	97.5	0.55	0.35	0.24	0.21	0.13
Sheridan	99.9	99.9	100.1	100.0	100.3	0.00	0.00	0.00	0.07	0.00
Sioux	100.0	99.7	99.9	100.8	100.4	0.02	0.00	0.00	0.00	0.00
Slope	100.0	81.1	100.0	100.0	100.0	0.00	0.00	0.00	0.00	0.00
Stark	100.0	100.0	100.0	100.0	100.0	0.13	0.14	0.13	0.10	0.10
City of Dickinson	100.0	98.5	96.4	96.5	97.5	0.11	0.12	0.14	0.15	0.12
Steele	102.0	104.1	103.5	97.5	97.5	0.14	0.10	0.16	0.06	0.12
Stutsman	100.0	100.0	100.0	100.0	100.0	0.06	0.04	0.07	0.17	0.13
City of Jamestown	106.2	100.0	100.0	100.0	93.9	0.37	0.12	0.10	0.15	0.20
Towner	101.0	98.2	100.1	99.9	97.5	0.20	0.16	0.12	0.15	0.23
Traill	102.8	101.2	96.6	96.6	98.2	0.46	0.35	0.36	0.35	0.36
Walsh	100.0	100.0	100.0	100.0	100.0	0.15	0.14	0.20	0.36	0.28
City of Grafton	100.4	100.8	100.5	100.0	100.0	0.11	0.11	0.11	0.08	0.14
Ward	97.4	98.5	99.6	99.6	94.1	0.31	0.25	0.27	0.27	0.38
City of Minot	99.6	95.5	96.2	98.7	97.5	0.19	0.18	0.17	0.13	0.14
Wells	100.0	100.2	101.8	102.6	101.0	0.09	0.23	0.44	0.46	0.60
Williams	106.4	100.0	101.0	97.6	97.6	0.21	0.20	0.20	0.14	0.21
City of Williston	96.2	99.1	92.4	97.4	99.2	0.26	0.22	0.19	0.11	0.13
State	100.0	100.0	100.0	100.0	100.0	0.21	0.20	0.20	0.19	0.19

Table 6
Average Prices Per Acre and Median Ratios for Agricultural Land

County	1998 No. of Sales	1998 Avg. Price Per Acre	Median Ratio
Adams	22	229	63.2
Barnes	17	405	68.8
Benson	26	309	76.7
Billings	2	NA	43.2
Bottineau	35	378	65.9
Bowman	13	273	57.8
Burke	9	198	84.0
Burleigh	3	NA	93.8
Cass	46	940	55.1
Cavalier	27	559	56.3
Dickey	35	328	82.5
Divide	19	314	60.1
Dunn	20	257	53.3
Eddy	10	232	98.9
Emmons	12	246	55.8
Foster	9	440	71.4
Golden Valley	8	181	79.5
Grand Forks	32	606	72.9
Grant	22	196	66.2
Griggs	8	459	74.5
Hettinger	16	316	53.9
Kidder	6	196	82.7
LaMoure	20	403	71.5
Logan	18	244	63.6
McHenry	25	213	92.2
McIntosh	54	215	81.5
McKenzie	15	310	53.6
McLean	32	357	63.3
Mercer	13	236	66.3
Morton	22	219	62.1
Mountrail	11	313	61.5
Nelson	13	240	93.3
Oliver	13	254	55.2
Pembina	29	600	71.6
Pierce	11	287	76.2
Ramsey	21	368	75.0
Ransom	15	425	78.4
Renville	12	466	57.3
Richland	30	966	54.8
Rolette	8	312	76.0
Sargent	24	505	7.3
Sheridan	14	226	76.6
Sioux	11	123	85.8
Slope	8	245	76.1
Stark	14	246	53.6
Steele	8	409	92.1
Stutsman	34	276	80.3
Towner	22	310	81.6
Traill	10	985	47.2
Walsh	37	642	68.9
Ward	34	475	57.6
Wells	26	361	73.1
Williams	53	296	57.2
State	1,054	361	67.2